

DETAILED ACTION

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claims 41, 42, 45-49, 62, 67-69, 72, 73, 75, 77, 81, 82, 84, 85, and 89-100 are again rejected under 35 U.S.C. 102(b) as being anticipated by Eckhouse et al. U.S. Patent No. 5,776,175.

Eckhouse et al. disclose a non-ablative phototherapy laser system and method of use for treating body tissue, the method comprising:

irradiating electromagnetic energy to the body tissue, the electromagnetic energy selected from laser pulses having a fluence of between 100 mJ/cm² to 10 J/cm² (see col. 5, lines 2-3) and pulse width of between 100 µs to 100 ms (see col. 2, lines 32-37); and

heating the target tissue to a temperature of up to 45 degrees Celsius (see col. 1, lines 57-60).

With respect to claims 49, 73, 75, 84, and 85, the treatment light source is selected from a group of light source including an Nd:YAG laser, which provides a near IR light (see col. 1, lines 41-42).

With respect to claims 68, 69, 82 and 99, Eckhouse et al. teach the method of directing treatment radiation having a small spot size on the order of about 5 mm is known in the art (see col. 1, line 46).

As to claims 81, 90, 93 and 96, the selected treatment area has a cross-sectional area of between 0.8 to 500 cm².

As to claim 98, the number of pulses selected for the treatment is between 1 to 100 pulses (see col. 4, lines 20-21).

As to claims 92 and 97, the treatment light pulses are applied to the selected treatment area for a time period of about 5 minutes (see col. 3, line 64 to col. 4, line 3).

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 43, 44, 50, 70, 71, 74, 80, 83, 86, 101 and 102 are rejected under 35 U.S.C. 103(a) as being unpatentable over Eckhouse et al.

As to claims 43, 44, and 80, Eckhouse et al., described above, do not particularly teach the recited laser peak power. However, their laser system would provide a peak power of 10-14 KW as claimed. As to claims 50, 74 and 86, they use an Nd:YAG laser in which the first harmonic generation pulses have a wavelength of 1064 nm. And, as to claims 70, 71 and 83, they teach the frequency of the laser pulses is between 0.1 to 1

Hz. However, their laser system is capable of providing pulse frequencies of between 2-12 Hz as claimed.

Therefore, at the time of the applicant's invention, it would have been obvious to one of ordinary skill in the art to use the Nd:YAG laser of Eckhouse et al. in order to provide treatment laser pulses having a wavelength of 1064 nm, peak power of 10-14 KW, and pulse frequency of 2-12 Hz as presently claimed.

Response to Arguments

Applicant's arguments filed on April 30, 2008, have been fully considered but they are not persuasive. The applicant makes the following arguments:

The applicant recognizes that Eckhouse teaches the use of laser light to treat body tissue. The applicant argues Eckhouse uses a broadband light source to provide the treatment, but fails to use a laser source, which provides the claimed pulse parameters such as the fluence, pulse width, frequency. He further argues Eckhouse heats the body tissue to treat a tumor whereas his invention is directed to method of heating skin tissue.

In response to the first argument, Eckhouse clearly teaches a method of treating body tissue with optical energy, through the skin, the optical energy having a fluence, pulse width, and frequency analogous to pulse parameters recited in the instant claims. Eckhouse further teaches in the background section of his invention the use of laser energy for providing similar treatments. The Examiner's position is that disclosure in the background section is prior art. Hence, Eckhouse anticipates the instant claims.

With respect to the second argument, the treatment energy of Eckhouse heats the skin tissue in which it passes through, thereby functionally treating any skin disorders thereof, such as wrinkles, scars, etc.

Conclusion

THIS ACTION IS MADE FINAL. Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Ahmed M. Farah whose telephone number is (571) 272-4765. The examiner can normally be reached on Mon, Tue, Thur and Fri between 9:30 AM 7:30 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Marmor II Charles can be reached on (571) 272-4730. The fax phone

Art Unit: 3735

number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Ahmed M Farah/
Primary Examiner, Art Unit 3735

September 30, 2008.